

Amendments to the Claims:

Please cancel Claims 1, 9, 13, 21, 25, 30, and 34 through 37 without prejudice to or disclaimer of the subject matter recited therein.

Please amend Claims 2 through 8, 10 through 12, 14 through 20, 22 through 24, 26 through 29, 31, and 32 to read, as follows.

**1. (Canceled)**

**2. (Currently Amended)** An image forming apparatus comprising: according to claim 1, further comprising

an image bearing member on a surface of which an electrostatic latent image is formed;

developing means, which contains a developer, and which includes a rotatable developer carrying member, which abuts against the surface of the image bearing member, and storage means storing information on image formation history,

wherein the developing means is adapted to visualize the electrostatic latent image formed on the surface of the image bearing member as the developer carrying member carries the developer to the electrostatic latent image;

a contact/separation mechanism, which enables the developer carrying member to abut against and separate from the surface of the image bearing member;

control means, which in a preparation process before image formation of second and subsequent times using the developing means, finds a lapsed time from a finish time of a last image formation until a start time of a current image formation based upon the

information on image formation history stored in the storage means and, in a state in which the image bearing member and the developer carrying member are separated from each other by the contact/separation mechanism, and operates the developer carrying member for a predetermined period of time according to the lapsed time; and

developer remaining amount detection means, ~~means~~ which detects an amount of developer remaining in the developing means,

wherein, in the preparation process before image formation of the second and subsequent times using the developing means, in ~~the~~ a state in which the image bearing member and the developer carrying member are separated from each other, the control means operates the developer carrying member for the predetermined period of time according to the lapsed time and information on the developer remaining amount detected by the developer remaining amount detection means.

3. **(Currently Amended)** An image forming apparatus according to claim ~~[[1]]~~ 2, further comprising environment detection means, ~~means~~ which detects an environmental state of an apparatus main body,

wherein, in the preparation process before image formation of the second and subsequent times using the developing means, in the state in which the image bearing member and the developer carrying member are separated from each other, the control means operates the developer carrying member for the predetermined period of time according to the lapsed time and information on the environmental state detected by the environment detection means.

4. **(Currently Amended)** An image forming apparatus according to claim [[1]] 2, wherein the operation of the developer carrying member for the predetermined period of time is an operation for giving a charge to the developer.

5. **(Currently Amended)** An image forming apparatus according to claim [[1]] 2, wherein the preparation process before image formation is a preparation process before the developer carrying member carries the developer to the electrostatic latent image.

6. **(Currently Amended)** An image forming apparatus according to claim [[1]] 2, wherein the developer is a mono-component nonmagnetic toner.

7. **(Currently Amended)** An image forming apparatus according to claim [[1]] 2, wherein the developer has a shape factor SF1 of 100 to 160 and a shape factor SF2 of 100 to 140.

8. **(Currently Amended)** An image forming apparatus according to claim [[1]] 2, wherein the developing means is a development cartridge, ~~cartridge~~ which is detachably attachable to the image forming apparatus.

9. **(Canceled)**

10. **(Currently Amended)** A control method for an image forming apparatus according to ~~claim 9~~;

~~wherein the image forming apparatus further comprises developer remaining~~  
~~amount detection means which detects an amount of developer remaining in the developing~~  
~~means, the control method further comprising: for controlling an image forming operation~~  
~~in an image forming apparatus including: an image bearing member; developing means,~~  
~~which contains a developer, and which includes a rotatable developer carrying member,~~  
~~which abuts against the image bearing member, and storage means storing information on~~  
~~image formation history, wherein the developing means is adapted to form an image~~  
~~formed on the image bearing member as the developer carrying member carries the~~  
~~developer to the image bearing member; a contact/separation mechanism, which enables~~  
~~the developer carrying member to abut against and separate from the surface of the image~~  
~~bearing member; and reading/writing means, which accesses the storage means; and~~  
~~developer remaining amount detection means, which detects an amount of developer~~  
~~remaining in the developing means.~~

the control method comprising the steps of:

reading the information on image formation history stored in the storage means  
with the reading/writing means before image formation of a second and subsequent times  
using the developing means;

finding a lapsed time from a finish time of a last image formation until a start time  
of a current image formation based upon the information on image formation history;

operating, in a state in which the image bearing member and the developer carrying  
member are separated from each other by the contact/separation mechanism, the developer  
carrying member for a predetermined period of time according to the lapsed time, and

operating, in ~~the~~ a state in which the image bearing member and the developer carrying member are separated from each other, the developer carrying member for the predetermined period of time according to the lapsed time and information on the developer remaining amount detected by the developer remaining amount detection means.

11. **(Currently Amended)** A control method for an image forming apparatus according to claim ~~[[9]]~~ 10, wherein the image forming apparatus further includes ~~comprises~~ environment detection means, ~~means~~ which detects an environmental state of an apparatus main body,

the control method further comprising the steps of: ~~comprising:~~

operating, in the state in which the image bearing member and the developer carrying member are separated from each other, the developer carrying member for the predetermined period of time according to the lapsed time and information on the environmental state detected by the environment detection means.

12. **(Currently Amended)** A control method for an image forming apparatus according to claim ~~[[9]]~~ 10, wherein the operation of the developer carrying member for the predetermined period of time is an operation for giving a charge to the developer.

13. **(Canceled)**

14. **(Currently Amended)** An image forming apparatus ~~according to claim 13;~~ comprising:

an image bearing member on a surface of which an electrostatic latent image is formed;

developing means, which contains a developer, and which includes a rotatable developer carrying member, which abuts against the surface of the image bearing member, and storage means storing information on image formation history and color information of the developer contained in the developing means,

wherein the developing means is adapted to visualize the electrostatic latent image formed on the surface of the image bearing member as the developer carrying member carries the developer to the electrostatic latent image;

a contact/separation mechanism, which enables the developer carrying member to abut against and separate from the surface of the image bearing member; and

control means which, in a preparation process before image formation using the developing means, judges whether the developing means is in an unused state based upon existence of information on image formation history stored in the storage means and, in a case in which the developing means is recognized as being in the unused state, and operates the developer carrying member for a predetermined period of time in a state in which the developer carrying member is separated from the surface of the image bearing member,

wherein color information of the developer contained in the developing means is further stored in the storage means, and

wherein in the a preparation process before image formation using the developing means, in the case in which the developing means is recognized as being in the unused

state, the control means controls an operation time of the developer carrying member according to the color information of the contained developer stored in the storage means.

15. **(Currently Amended)** An image forming apparatus according to claim [[13]] 14, further comprising environment detection means which detects an environmental state of an apparatus main body,

wherein, in the preparation process before image formation using the developing means, in the case in which the developing means is recognized as being in the unused state, the control means controls an operation time of the developer carrying member according to the information on the environmental state detected by the environment detection means.

16. **(Currently Amended)** An image forming apparatus according to claim [[13]] 14, wherein the preparation process before image formation is a preparation process before the developer carrying member carries the developer to the electrostatic latent image.  
~~operation of the developer carrying member for the predetermined period of time is an operation for giving a charge to the developer.~~

17. **(Currently Amended)** An image forming apparatus according to claim [[13]] 14, wherein a preparation process before image formation is a preparation process ~~means at least~~ before the developer carrying member carries the developer to the electrostatic latent image.

18. **(Currently Amended)** An image forming apparatus according to claim [[13]]  
14, wherein the developer is a mono-component nonmagnetic toner.

19. **(Currently Amended)** An image forming apparatus according to claim [[13]]  
14, wherein the developer has a shape factor SF1 of 100 to 160 and a shape factor SF2 of  
100 to 140.

20. **(Currently Amended)** An image forming apparatus according to claim [[13]]  
14, wherein the developing means is a development cartridge, ~~cartridge~~ which is  
detachably attachable to the image forming apparatus.

21. **(Canceled)**

22. **(Currently Amended)** A control method for an image forming apparatus  
~~according to claim 21~~, including: an image bearing member; developing means, which  
contains a developer, and which includes a rotatable developer carrying member, which  
abuts against the image bearing member; and storage means storing information on image  
formation history and color information of the developer contained in the developing  
means, wherein the developing means is adapted to form an image on the image bearing  
member as the developer carrying member carries the developer to the image bearing  
member; a contact/separation mechanism, which enables the developer carrying member to  
abut against and separate from the surface of the image bearing member; and  
reading/writing means, which accesses the storage means,



the control method comprising the steps of:  
reading the information on image formation history stored in the storage means  
with the reading/writing means before image formation using the developing means;  
judging whether or not the developing means is in an unused state according to a  
presence or absence of the information on image formation history;  
operating, in a case in which the developing means is judged to be in the unused  
state, the developer carrying member for a predetermined period of time in a state in which  
the developer carrying member is separated from the image bearing member,  
~~wherein color information of the developer contained in the developing means is~~  
~~further stored in the storage means, the control method further comprising:~~  
reading, in the case in which the developing means is judged to be in the unused  
state, the color information of the contained developer recorded in the storage means with  
the reading/writing means; and  
operating the developer carrying member for the predetermined period of time  
according to the color information of the contained developer.

23. **(Currently Amended)** A control method for an image forming apparatus  
according to claim ~~[[21]]~~ 22, wherein the image forming apparatus further includes  
~~comprises~~ environment detection means, ~~means~~ which detects an environmental state of an  
apparatus main body,

the control method further comprising the steps of: ~~comprising:~~

operating, in the case in which the developing means is judged to be in the unused state, the developer carrying member for the predetermined period of time according to information on the environmental state obtained by the environment detection means.

24. **(Currently Amended)** A control method for an image forming apparatus according to claim ~~[[21]]~~ 22, wherein the operation of the developer carrying member for the predetermined period of time is an operation for giving a charge to the developer.

25. **(Canceled)**

26. **(Currently Amended)** An image forming apparatus according to claim ~~[[25]]~~ 27, wherein, in the case in which the developing means is in an unused state, the control means operates the developer carrying member for the predetermined period of time in the state in which the developer carrying member is separated from the surface of the image bearing member.

27. **(Currently Amended)** An image forming apparatus ~~according to claim 25,~~  
comprising:

an image bearing member on a surface of which an electrostatic latent image is  
formed;

developing means, which contains a developer, and which includes: a rotatable  
developer carrying member, which abuts against the surface of the image bearing member,  
said developing means being adapted, in a state in which the developer carrying member is

brought into contact with the image bearing member, to carry the developer from the developer carrying member to the electrostatic latent image to thereby visualize the electrostatic latent image formed on the surface of the image bearing member;

a contact/separation mechanism, which enables the developer carrying member to abut against and separate from the surface of the image bearing member; and

control means, which in a state in which the developer carrying member is separated from the surface of the image bearing member, operates the developer carrying member for a predetermined period of time based upon a state of the developing means,

wherein, in the a case in which the developing means is in an unused state, the control means operates the developer carrying member for the predetermined period of time in the a state in which the developer carrying member is separated from the surface of the image bearing member based upon color information of the developer.

28. **(Currently Amended)** An image forming apparatus according to claim [[25]] 27, wherein, in the case in which the developing means is in an unused state, the control means operates the developer carrying member for the predetermined period of time in the state in which the developer carrying member is separated from the surface of the image bearing member based upon environmental information of an apparatus main body.

29. **(Currently Amended)** An image forming apparatus according to claim [[25]] 27, wherein the operation of the developer carrying member for the predetermined period of time is an operation for giving a charge to the developer.

30. (Canceled)

31. (Currently Amended) An image forming apparatus ~~according to claim 30~~,  
comprising:

an image bearing member on a surface of which an electrostatic latent image is  
formed;

developing means, which contains a developer, and which includes a rotatable  
developer carrying member, which abuts against the surface of the image bearing member,  
the developing means being adapted to visualize the electrostatic latent image on the  
surface of the image bearing member as the developer carrying member carries the  
developer to the electrostatic latent image;

a contact/separation mechanism, which enables the developer carrying member to  
abut against and separate from the surface of the image bearing member; and

control means, which operates the developer carrying member according to a lapsed  
time from a finish time of image formation of the last time until a start time of image  
formation of this time,

wherein, in a state in which the developer carrying member is separated from the  
surface of the image bearing member, the control means operates the developer carrying  
member for a predetermined period of time based upon the lapsed time and information on  
a remaining amount of the developer in the developing means.

32. (Currently Amended) An image forming apparatus according to claim [[30]]  
31, wherein, in a state in which the developer carrying member is separated from the

surface of the image bearing member, the control means operates the developer carrying member for a predetermined period of time based upon the lapsed time and environmental information of an apparatus main body.

33. **(Original)** An image forming apparatus according to claim 31, wherein the operation of the developer carrying member for the predetermined period of time is an operation for giving a charge to the developer.

Claims 34 through 37. **(Canceled)**